

For Immediate Release

Media contact:

Dean Campbell

803.208-8270

[Dean.Campbell@srs.gov](mailto:Dean.Campbell@srs.gov)

## **SRS Partnering Leads Toward Deployment of New Chemical Extraction Solvent**

AIKEN, S.C. (February 27, 2012) – A recent partnering initiative between Savannah River Site (SRS) contractors, national laboratories and the U.S. Department of Energy (DOE) is expected to lead to a more effective solvent used to extract radionuclides from radioactive salt waste, currently inside the Site's underground waste tanks.

The new solvent, developed primarily by the Oak Ridge National Laboratory (ORNL), is called the Next Generation Solvent (NGS). NGS was designed to be similar to the solvent currently used, but laboratory testing at ORNL and Savannah River National Laboratory (SRNL) indicate it is more effective in extracting cesium from the salt waste. The extraction of cesium is necessary before the waste can be dispositioned.

In 2012, the improved performance characteristics of NGS are to be evaluated in full-scale equipment at the Parsons Test Facility, for its potential to increase the rate at which the waste can be decontaminated through the Salt Waste Processing Facility (SWPF). If the solvent proves its effectiveness during these tests, further development will continue toward evaluating its future use in the SWPF and compatibility with downstream facilities. SWPF, which is currently under construction, will begin operations with the current generation of solvent.

SRR has worked in conjunction with SRNL, ORNL and Parsons, the SWPF contractor, to prepare the solvent for testing, a partnership that is proving its worth, according to Keith Harp, SRR's SWPF Interface Program Manager.

"Our partnership with DOE, SRNL and Parsons has resulted in the solvent being delivered and stationed for testing," Harp said. "It has taken considerable interaction among all partners to get to this stage."

Through the partnership, DOE requested the NGS makeup and delivery from SRR. Working with vendors and SRNL, SRR was able to procure and prepare the solvent, which was delivered to the Parsons Technology Center in Aiken on December 5, 2011. Parsons is scheduled to begin testing the NGS in February 2012 to evaluate increased throughput in its Large Scale Test Facility. Testing is targeted for completion in December 2012.

(more)

(add one – SRS Partnering)

Terrel Spears, Assistant Manager for Waste Disposition Project, DOE Savannah River Operations, and Tony Polk, SWPF Federal Project Director, agree the initiative was the latest example of contractors and DOE working together for the benefit of SRS and taxpayers.

“When SRS contractors work together, taxpayers benefit,” Spears said. “Planned test conditions could reach the equivalent of a 20 percent increase in the SWPF facility’s throughput.”

Once operational, the SWPF will replace SRR’s Interim Salt Disposition Process, which has been processing salt waste since startup in April 2008.

SRS is owned by DOE. The SRS Liquid Waste contract is managed by SRR, a team of companies led by URS Corp. with partners Bechtel National, CH2M Hill and Babcock & Wilcox. Critical subcontractors for the contract are AREVA, Energy Solutions and URS Safety Management Solutions.

SRR-2011-09